

CLAIMS

1. A method for smoothing a surface of a powder-sintered laminated resin model with a porous rough surface characterized by comprising:

5 a resin impregnation step of dipping said powder-sintered laminated resin model (A) in a two-pack reaction hardening type urethane resin solution (B) with a work life of 1 to 5 minutes and viscosity of 7 to 30 Pas and then decreasing pressure so as to impregnate said surface of said resin model (A) with said two-pack reaction hardening type urethane
10 resin solution (B); and

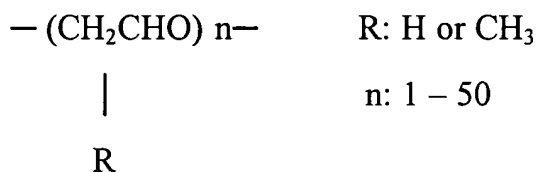
a resin hardening step of bringing up said powder-sintered laminated resin model (A) impregnated with said two-pack reaction hardening type urethane resin solution (B) from said two-pack reaction hardening type urethane resin solution (B) and hardening said resin
15 model (A).

2. A method for smoothing a surface according to claim 1, characterized in that said two-pack reaction hardening type urethane resin solution (A) preferably comprises multifunctional polyol component (a),
20 multifunctional polyisocyanate component (b) and a plasticizer component (c), and an average functional group of the multifunctional polyol component (a) is preferably in a range from 2.0 to 4.0, an average functional group of the multifunctional polyisocyanate component (b) is preferably in a range from 3.0 to 5.0, and a ratio NCO/OH is preferably
25 in a range from 0.7 to 1.0.

3. A method for smoothing a surface according to claim 1 or 2,

characterized in that:

said two-pack reaction hardening type urethane resin solution (A) preferably contains a plasticizer component (c) of 10 - 30 % which is in a liquid state at normal temperature and polyether chains having a chemical structure indicated in the chemical structural formula as follows at 5 - 35 wt% thereof.



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4. A method for smoothing a surface according to claim 1, 2 or 3, characterized in that:

said plasticizer component (c) is preferably micro-dispersed through phase separation at said reaction hardening of the two-pack reaction hardening type urethane resin solution (B).

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5. A process for lost wax precision casting using said powder-sintered laminated resin model having a surface smoothed by said method according to any one of claims 1 to 4.